

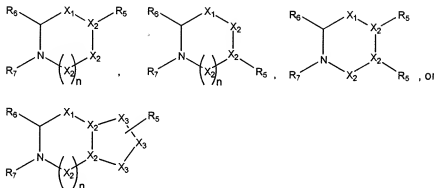
Amendments to the Claims:

The listing of claims will replace all prior versions and listings of claims in the application.

Listing of Claims:

Claims 1-72 (canceled)

Claim 73 (new): A peptidomimetic comprising the formula:



wherein

X₁ is (CH₂)_m or X₃;

X₂ is independently CH₂, CH, NH or N;

X₃ is independently (CH₂)_n, CH, NH, N, O, C=O, C=S, S, S=O, or SO₂;

R₅ is any moiety other than H;

R₆ is an amino acid side chain moiety or derivative thereof;

R₇ is one or more amino acid residues or derivatives thereof and optionally a terminal group moiety, or is an amino acid side chain moiety or derivative thereof;

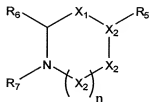
R₇ and at least one of R₆ or R₅ each constitute an element occupying a similar descriptor space as corresponding elements of the biologically active metallopeptide;

n is 0, 1, 2 or 3; and

m is 0 or 1;

provided that any two adjacent CH groups, adjacent NH and CH groups or adjacent NH groups may optionally form a double bond.

Claim 74 (new): A peptidomimetic of claim 73 having the formula:



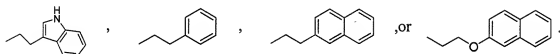
wherein

X₁ is (CH₂)_m or X₃;

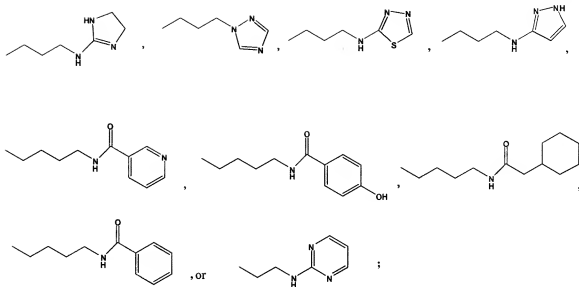
X₂ is independently CH₂ or N;

X₃ is C=O;

R₅ is



R₆ is -(CH₂)₄NH₂, -(CH₂)₃NHC(NH₂)=NH, -(CH₂)₃NHCOCH₃, -(CH₂)₃NHCOOCH₃,
 -(CH₂)₂NHC(NH₂)=NH, -(CH₂)₂NHCONH₂, -(CH₂)₄NHCOH, -(CH₂)₄NHCOCH₃,
 -(CH₂)₃NHCONHCH₃, -(CH₂)₃NHSO₂NH₂, -(CH₂)₃NHSO₂CH₃, -(CH₂)₃NH₂,
 -(CH₂)₂CONH₂, -(CH₂)₃NH(C=NH)NHMe, -(CH₂)₃NH(C=NH)NHEt,
 -(CH₂)₃NH(C=NH)NHPr, -(CH₂)₃NH(C=NH)NHPr-i, -(CH₂)₃NH(C=NH)NH₂,
 -(CH₂)₄NHCONH₂, -(CH₂)₄NH(C=NH)NH₂,



R_7 is R_9-R_8- , where

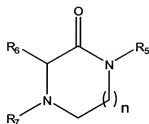
R_8 is an L- or D-configuration of Phe, Phe(2-Cl), Phe(4-Cl), Phe(2,4-diCl), Phe(3,4-diCl), Phe(4-NO₂), Phe(4-Me), Phe(4-Phenyl), HPhe, Pgl, Trp, Nal 1, Nal 2, Bip, Dip, Bpa, Ser(Bzl), Lys(Z), Lys(Z-2'Br), Lys(Bz), Thr(Bzl), Cys(Bzl), Tyr(BzlCl₂), pF-Phe, Phe(4-Br), Phe(4-CF₃), Phe(3,4-diF), Phe(4-I) or Phe(3,4-di-OMe); and

R_9 is optionally not present or is an L- or D-configuration of His, Ser(Bzl), Tic, heptanoyl-Ser(Bzl), hexanoyl-Ser(Bzl), Hyp(Bzl), 4-phenylPro, 5-phenylPro, Tiq, Atc, Igl, Hyp(O-2-Naphthyl), Hyp(O-Phenyl), 2-Aic, Idc, 1-Aic, NH₂(CH₂)₆CO-, Benzyl, Beta-homoSer(Bzl), Ser(O-2-Naphthyl), Ser(O-Phenyl), Ser(O-4-Cl-Phenyl), Ser(O-2-Cl-Phenyl), Thr(Bzl), Tic, heptanoyl-Thr(Bzl), hexanoyl-Thr(Bzl), Beta-homoThr(Bzl), Thr(O-2-Naphthyl), Thr(O-Phenyl), Thr(O-4-Cl-Phenyl) or Thr(O-2-Cl-Phenyl); and

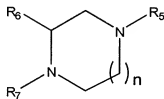
n is 1; and

m is 1.

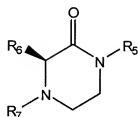
Claim 75 (new): A peptidomimetic of claim 74 having the formula:



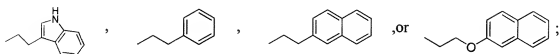
Claim 76 (new): The peptidomimetic of claim 74 having the formula:



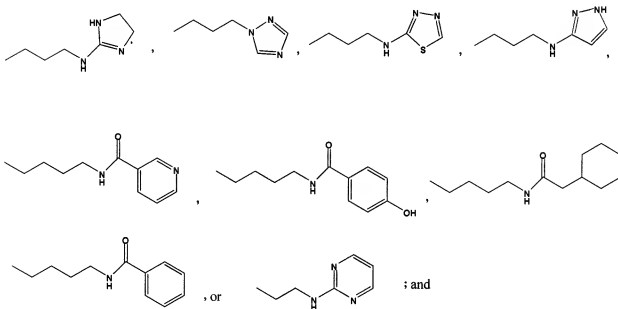
Claim 77 (new): The peptidomimetic of claim 74 having the formula:



Wherein R₅ is



R_6 is $-(CH_2)_4NH_2$, $-(CH_2)_3NHC(NH_2)=NH$, $-(CH_2)_3NHCOCH_3$, $-(CH_2)_3NHCOOCH_3$,
 $-(CH_2)_2NHC(NH_2)=NH$, $-(CH_2)_2NHCONH_2$, $-(CH_2)_4NHCOH$, $-(CH_2)_4NHCOCH_3$,
 $-(CH_2)_3NHCONHCH_3$, $-(CH_2)_3NHSO_2NH_2$, $-(CH_2)_3NHSO_2CH_3$, $-(CH_2)_3NH_2$,
 $-(CH_2)_2CONH_2$, $-(CH_2)_3NH(C=NH)NHMe$, $-(CH_2)_3NH(C=NH)NHEt$,
 $-(CH_2)_3NH(C=NH)NHPr$, $-(CH_2)_3NH(C=NH)NHPr-i$, $-(CH_2)_3NH(C=NH)NH_2$,
 $-(CH_2)_4NHCONH_2$, $-(CH_2)_4NH(C=NH)NH_2$,



R_7 is R_9-R_8- , where

R_8 is L- or D-Phe, pF-Phe, Phe(4-Br), Phe(4- CF_3), Phe(4-Cl), Phe(2-Cl), Phe(2,4-diCl),
Phe(3,4-diCl), Phe(3,4-diF), Phe(4-I), Phe(3,4-di-OMe), Phe(4-Me) or Phe(4- NO_2);
and

R_9 is optionally not present or is an L- or D-His, Ser(Bzl), Tic, heptanoyl-Ser(Bzl),
Hyp(Bzl), 4-phenylPro, 5-phenylPro, Tiq, Atc, Igl, Hyp(O-2-Naphthyl),
Hyp(O-Phenyl), 2-Aic, Idc, 1-Aic, $NH_2(CH_2)_6CO-$, Benzyl, Beta-homoSer(Bzl),
Ser(O-2-Naphthyl), Ser(O-Phenyl), Ser(O-4-Cl-Phenyl) or Ser(O-2-Cl-Phenyl).

Claim 78 (new): A pharmaceutical composition comprising a peptidomimetic of any one
of claims 73-77 and a pharmaceutically acceptable carrier.

Claim 79 (new): A method of treating a disease or condition comprising administering a peptidomimetic of any one of claims 73-77, wherein the disease or condition is an eating disorder, pathologic obesity, or sexual dysfunction.

Claim 80 (new): The method of claim 79, wherein the sexual dysfunction is male erectile dysfunction or female sexual dysfunction.

Claim 81 (new): The method of claim 79, wherein the peptidomimetic is administered as a pharmaceutical composition together with a pharmaceutically acceptable carrier.